

Arctornis l-nigrum (Müller, O.F., 1764) (Lep.:
Lymantriidae): The Black V Moth — a Possible
Occasional Resident Species in Britain

By A. J. DEWICK*

Although there has been a number of references to this species in Britain over the years, for the purposes of this note it is proposed to deal purely with occurrences this century.

A single specimen appears to have occurred at Chelmsford in July 1904 (*Ent. Rec.*, 67: 213) and a single male was taken at light at Arundel, Sussex, on July 7th, 1946, by Mr. G. Haggett.

On June 27th, 1947, I was astonished to find two males here in my own light-trap. On the 29th, there were two more, and these were followed by a single male specimen on each of the next two nights. The three best specimens were retained and one of these subsequently went to the late W. P. Seabrook. At the time, it was assumed that these were stray migrants from the Continent. Then, in 1948, another male occurred on June 26th and a second on July 30th.

These two further specimens naturally raised the question that the species might be breeding locally and it was considered only prudent to suppress the fact of these occurrences while waiting to see if further specimens occurred here or elsewhere.

In 1949, two more males appeared, on July 12th and 14th. In 1950, yet another male occurred, this time on June 29th, followed by another on July 3rd, yet another on July 4th, two on the 5th, another on the 6th and three on the 7th. Since it now seemed reasonably certain that the species must be breeding locally, one felt that it was time to see if specimens could be found other than in the moth-trap.

The next night, therefore, the car headlights were trained on a row of elm trees and this did, in fact, attract a single male, while the moth-trap also produced a single male. On July 13th, two more males occurred in the trap, and the next night a single male appeared on one of the lighted windows of the farmhouse. The last specimen of the season occurred in the moth-trap on July 16th, and this turned out to be a female, the only one obtained so far.

Without much difficulty, this female was persuaded to lay, and the small caterpillars hibernated with very few casualties. In the light of subsequent events, this success in hibernating seemed curious, as two later attempts to repeat the performance were an almost unmitigated disaster. One can only assume that the first attempt was beginner's luck!

In 1951, three males occurred in the light-trap on July 9th, with another male on the 12th and another on the 15th. Meanwhile, specimens from the previous year's female had begun to hatch, the majority being released though a small series was retained. Two males were attracted to a bred female on the 14th and three more on the 15th, at places about a

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mile and four miles from the trap. Attempts to "assemble" at greater distances were unsuccessful but were strictly limited when it was found that after two nights females stopped "calling" and began to lay infertile eggs. Once this had occurred, they would not pair even if males were introduced. The light-trap produced two more males on the 16th, one on the 17th, one on the 19th and a final one for the year on the 23rd.

In 1952, the first two specimens, both males, occurred in the trap on June 26th; four more occurred on the 29th, two on July 1st and five on July 2nd.

On June 22nd, 1953, I noticed a larva, which I immediately recognised as that of *L. nigrum*, feeding on an elm hedge; this duly pupated and the resulting moth (a male) emerged on July 7th. The first male of the season in the light-trap appeared on the last day of June, followed by a single specimen on each of the next five nights, with two on July 6th and a final male on the 7th. On July 16th, another female was taken in the light-trap and this was the last of the species for that year.

In 1954, a male appeared on July 9th, two more singles on the 14th and 16th respectively, two on the 24th and a final one on the 25th.

In 1955, a male appeared on July 13th, another the next night, one more on the 20th and a final one for the year on the 30th. At this stage one began to think the colony was in decline, but on July 7th, 1956, four males occurred in the trap, with singles on the next three nights, one more on the 12th, another on the 14th, two on the 17th and two more on the 19th. Then, a female occurred on the 20th and a final male for the year on the 29th.

In 1957, the first specimen occurred on July 3rd, two on the 4th, one on the 5th, one on the 7th and one more on the 11th. In 1958, only a single male occurred in the trap, on July 2nd. This sudden decrease proved to have been a bad omen. In 1959, a male was taken on June 24th, followed by three the next night and a final one for the year on the 27th. In 1960, only two specimens occurred, both on July 5th. None has occurred here since.

It would, therefore, seem that the colony died out from natural causes, as no wild specimens had been killed except the three in the first year. Since 1946, none appears to have been reported from anywhere else in Britain.

I am not aware of any other record of the species occurring in an unbroken series of years anywhere else in the British Isles and it seems quite likely that an important factor in a colony being able to maintain itself is a dry climate; Bradwell-on-Sea being within a few miles of Great Wakering, which is apparently officially the driest place in Britain.

It is interesting to note that part of the period during which this colony existed, i.e. 1947-1951 inclusive, were the

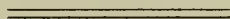
years in which the Pale Clouded Yellow, *Colias hyale* L., also appeared to be temporarily established in this immediate vicinity, as it occurred annually in a spring and summer brood. It therefore seems likely that this butterfly can also survive the English climate for limited periods given dry enough conditions.

It may also be significant that the moth, *L. albipuncta* D. & S., also occurred with great regularity from 1949-1956 inclusive, again in two broods and, in some years, in considerable numbers, although since the latter date this species has been rare to the point of virtual non-existence.

It is probable that *L. nigrum* would be an extremely difficult species to locate except by the use of light, as there is reason to believe that the whole life-cycle may well be entirely in the tops of the tallest trees. The specimens that occurred in the light-trap were all removed and marked, to avoid any possibility of counting them twice, and, although these were all released into thick cover, any which did not settle down quietly always flew to the very top of the elm trees, where they appeared to settle. In this connection, it is significant that the only larva found wild was under the most active part of our rookery, which at least suggests that it might have been dislodged by the movement of the rooks.

The egg is in the form of a flat disc and pale green in colour and the larva emerges by eating a hole in the side. Although the normal form of the larva has yellowy-golden hairs, in a small proportion these are replaced by white. The moth when first hatched is a light green, but this soon fades and it appears always to have been described as a "white" moth. All my bred specimens had been fed on lime as larvae and the resulting moths were slightly larger than those occurring in the wild. It is likely that in this area at least the foodplant in the wild would be elm.

Owing to the insect's infrequent appearance in Britain, it is probable that the year in which this latest migration took place was, in fact, 1946, the year of Mr. Haggett's specimen at Arundel. At that time my trap was still in the development stage and there is no doubt it was nothing like as effective as in the following year, when the first six specimens were taken.



THE SCARCE PROMINENT (*ODONTOSIA CARMELITA* ESP.) AND OTHER SPECIES AT TROTTSCLIFFE, KENT. — On the evening of 6th May, 1978, two specimens of *O. carmelita* Esp. came to my m.v. trap operated in the wood area at Trottscliffe. I don't know whether this is a new Kent locality for this moth, but I can find no record of it being taken there in Volume II of the *Lepidoptera of Kent*. Among the 21 moths of 13 species, were also four *Drymonia ruficornis* Hufn., one *Selenia tetralunaria* Hufn. and one *Trichopteryx carpinata* Bork. — DENNIS DEY, 9 Monmouth Close, Rainham, Gillingham, Kent ME8 7BQ.